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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/605,807	10/28/2003	Hsin-Hung Lee	10932-US-PA	2806
31561 7590 05/03/2007 JIANQ CHYUN INTELLECTUAL PROPERTY OFFICE 7 FLOOR-1, NO. 100 ROOSEVELT ROAD, SECTION 2 TAIPEI, 100 TAIWAN			EXAMINER XIAO, KE	
			ART UNIT 2629	PAPER NUMBER
			NOTIFICATION DATE 05/03/2007	DELIVERY MODE ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

Office Action Summary

Application No.

10/605,807

Applicant(s)

LEE ET AL.

Examiner

Ke Xiao

Art Unit

2629

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 26 February 2007.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-4 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-4 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date: _____.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-4 are rejected under 35 U.S.C. 103(a) as being unpatentable over the applicant's admitted prior art (AAPA) in view of Yamazaki (US 2003/0146888).

Regarding **Claims 1 and 2**, the AAPA teaches a display unit of an active matrix organic light emitting display (AAPA, Fig. 3 Paragraph [0006]), comprising:

a first transistor, having a gate for receiving a first driving signal, the first transistor determining whether or not to conduct a second signal based on the first driving signal (AAPA, Fig. 3 Paragraph [0006]);

a second transistor, having a gate for receiving the second signal, the second transistor determining whether or not to conduct a power source based on the second signal (AAPA, Fig. 3 Paragraph [0006]); and

an organic light emitting diode, receiving the power source to emit a light (AAPA, Fig. 3 Paragraph [0006]);

wherein the second transistor is a P-type transistor having a threshold voltage (AAPA, Fig. 3 Paragraph [0006]),

The AAPA fails to teach that the absolute value of the threshold voltage of the second transistor is between 2.5V to 3.5V. Yamazaki teaches that P-type transistors can be operated using a threshold voltage with an absolute value of 2.5V to 3.5V (Yamazaki, Fig. 6, pp. 5 and 6 paragraph [0095]). It would have been obvious to one of ordinary skill in the art at the time of the invention to have use P-type transistor with a threshold voltage of 2.5V to 3.5V as taught by Yamazaki in place of the second transistor as taught by the AAPA in order to allow for both constant voltage drive and constant current drive in an OLED display and to allow the display to compensate for the different characteristics of OLED materials according to color (Yamazaki, Pg. 5 paragraph [0092]).

Regarding **Claims 3 and 4**, AAPA teaches that the first transistor is a P-type transistor with a threshold voltage. AAPA fails to teach that an absolute value of the threshold voltage of the first transistor is between 2.5V to 3.5V. Yamazaki teaches that P-type transistors can be operated using a threshold voltage with an absolute value of 2.5V to 3.5V (Yamazaki, Fig. 6). It would have been obvious to one of ordinary skill in the art at the time of the invention to have use P-type transistor with a threshold voltage of 2.5V to 3.5V as taught by Yamazaki in place of the first transistor as well as the second transistor as taught by the AAPA in order to reduce manufacturing costs and complexity.

Response to Arguments

Applicant's arguments filed February 26th, 2007 have been fully considered but they are not persuasive.

The applicant argues that the motivation provided by the examiner is not sufficient to combine the AAPA and Yamazaki. The examiner has since made clear the motivation to combine in the above rejection. The grounds of rejection remain the same. Further the applicant argues that the 2.5V gate voltage applied to the PMOS transistor of Yamazaki does not equate to threshold voltage. The examiner respectfully disagrees. The -8V is the potential of the drain of the OLED it has nothing to do with the threshold voltage, the +9V is the source potential of the TFT not the threshold. The threshold voltage as defined in the art is the voltage between the gate and the drain of a transistor at which the transistor becomes conductive. The 2.53V is clearly the gate voltage and the drain voltage of the same transistor is 0V, which means that the threshold voltage of said transistor is 2.53V (Yamazaki, pp. 5 and 6 paragraph [0095]).

In response to applicant's argument that Yamasaki's endeavor is different from the applicant's endeavor, the fact that applicant has recognized another advantage which would flow naturally from following the suggestion of the prior art cannot be the basis for patentability when the differences would otherwise be obvious. See *Ex parte Obiaya*, 227 USPQ 58, 60 (Bd. Pat. App. & Inter. 1985).

Conclusion

THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ke Xiao whose telephone number is (571) 272-7776. The examiner can normally be reached on Monday through Friday from 8:30AM to 5:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Sumati Lefkowitz can be reached on (571) 272-3638. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

April 25th, 2007 - kx -


SUMATI LEFKOWITZ
SUPERVISORY PATENT EXAMINER